



Atg4A Polyclonal Antibody

Catalog No	YP-Ab-02502
Isotype	IgG
Reactivity	Human;Mouse
Applications	WB;IHC;IF;ELISA
Gene Name	ATG4A
Protein Name	Cysteine protease ATG4A
Immunogen	The antiserum was produced against synthesized peptide derived from human ATG4A. AA range:81-130
Specificity	Atg4A Polyclonal Antibody detects endogenous levels of Atg4A protein.
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source	Polyclonal, Rabbit,IgG
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	Western Blot: 1/500 - 1/2000. Immunohistochemistry: 1/100 - 1/300. Immunofluorescence: 1/200 - 1/1000. ELISA: 1/20000. Not yet tested in other applications.
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	ATG4A; APG4A; AUTL2; Cysteine protease ATG4A; AUT-like 2 cysteine endopeptidase; Autophagin-2; Autophagy-related cysteine endopeptidase 2; Autophagy-related protein 4 homolog A; hAPG4A
Calculated Molecular Weight	45kD
Cell Pathway	Cytoplasm .
Tissue Specificity	Epithelium,Kidney,Ovary,Prostate,Testis,
Function	enzyme regulation:Inhibited by N-ethylmaleimide.,function:Cysteine protease required for autophagy, which cleaves the C-terminal part of either MAP1LC3, GABARAPL2 or GABARAP, allowing the liberation of form I. A subpopulation of form I is subsequently converted to a smaller form (form II). Form II, with a revealed C-terminal glycine, is considered to be the phosphatidylethanolamine (PE)-conjugated form, and has the capacity for the binding to autophagosomes. Preferred substrate is GABARAPL2 followed by MAP1LC3A and GABARAP.,similarity:Belongs to the peptidase C54 family.,tissue specificity:Widely expressed, at a low level, and the highest expression is observed in skeletal muscle and brain. Also detected in fetal liver.,



Background

Autophagy is the process by which endogenous proteins and damaged organelles are destroyed intracellularly. Autophagy is postulated to be essential for cell homeostasis and cell remodeling during differentiation, metamorphosis, non-apoptotic cell death, and aging. Reduced levels of autophagy have been described in some malignant tumors, and a role for autophagy in controlling the unregulated cell growth linked to cancer has been proposed. This gene encodes a member of the autophagin protein family. The encoded protein is also designated as a member of the C-54 family of cysteine proteases. [provided by RefSeq, Mar 2016],

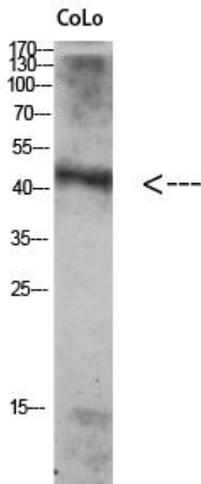
matters needing attention

Avoid repeated freezing and thawing!

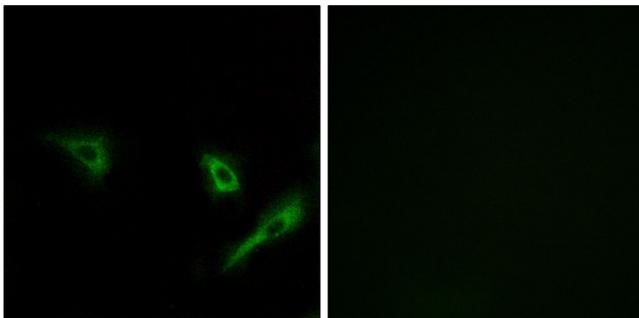
Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

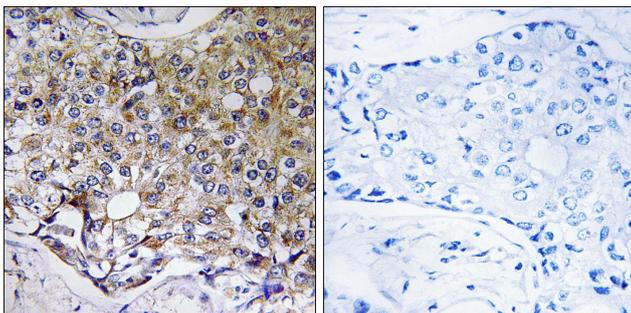
Products Images



Western Blot analysis of Colo using Antibody diluted at 1:1000. Secondary antibody(catalog#:RS0002) was diluted at 1:20000



Immunofluorescence analysis of A549 cells, using ATG4A Antibody. The picture on the right is blocked with the synthesized peptide.



Immunohistochemistry analysis of paraffin-embedded human breast carcinoma tissue, using ATG4A Antibody. The picture on the right is blocked with the synthesized peptide.